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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/534,101	05/06/2005	Isabelle Dubourg	21.1034	2427

23718 7590 01/19/2007  
SCHLUMBERGER OILFIELD SERVICES  
200 GILLINGHAM LANE  
MD 200-9  
SUGAR LAND, TX 77478

EXAMINER
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MCELHENY JR, DONALD E

ART UNIT	PAPER NUMBER
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2857

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	01/19/2007	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

10/534,101

Applicant(s)

DUBOURG ET AL.

Examiner

Donald E. McElheny, Jr.

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 28 November 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-13 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-13 is/are rejected.
- 7) ☒ Claim(s) 13 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some\* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |                                                                                                                        |                                                                                         |
|------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                                                       | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____                                                |

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

2. Claims 1-13 are again rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter and the claimed invention lacks patentable utility.

Please be advised that the "Interim Guidelines for Examination of Patent Applications for Subject Matter Eligibility" was signed on Oct 26, 2005 and posted on the uspto.gov website. The link is:

<http://www.uspto.gov/web/offices/pac/dapp/ogsheet.html>

Also see updated MPEP 2106, which covers algorithm and computer implemented inventions and the manner in which they may be claimed and find statutory basis under 35 U.S.C. 101.

Note the claims do not recite any requirement of computer implementation. However, even if there were such claimed basis, they would still fail to meet the latest Guidelines criteria for having statutory basis in any type of claimed invention for algorithm based inventions. These claims fail to meet the minimal requirement of a useful, concrete and tangible result of a real physical world interactive end result supported by any algorithm steps, or structure supporting such calculated step, where the end result limitation/data supports the invention being used in a practical useful, concrete and tangible real world combination manner.

Applicants' claims remain non-statutory as amended as they still lack a physical transformation of the final calculation result of the method algorithm, thus lacking a

useful, concrete and tangible result within the real physical world. The claims therefore remain merely directed to calculations and falling as a judicial exception (law of nature, abstract idea, naturally occurring article/phenomenon) as non-statutory subject matter.

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 1-13 are again rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

See the above remarks as the claims remain non-statutory and likewise still fail to comply with section 112.

Claim 1 preamble states the claim is directed to a method for determining resistivity in a geological formation crossed by a cased well. However, while body of the claim may state a final resistivity being calculated of such nature, the body of the claim still is incomplete for omitting essential steps of ever accomplishing the a tangible, concrete and useful interaction of such calculated result, and such omission amounting to a gap between the steps and the potential statutory invention using such calculation. See MPEP § 2172.01.

5. Claim 13 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. Subject to the fourth paragraph of 35 U.S.C. 112, a claim in dependent form shall contain a reference to a

claim previously set forth and then specify a further limitation of the subject matter claimed. Claim 13 fails to comply with such fourth paragraph, as it begins with something entirely different than a prior claim and then adds limitations including reference to a prior claim. The format of this claim also makes it indefinite as to whether the method steps of the parent claim are even required, or merely the calculated result of the parent claim is the only item being used therefrom, thus it cannot be determined what exactly applicant intends as the claimed combination to be covered. Since the claim appears to require all steps for the calculation component used, it must therefore clearly recite all parent claim steps as an independent claim, or be amended to start with the parent claim subject and then its own as a proper dependent claim.

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

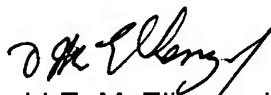
7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Donald E. McElheny, Jr. whose telephone number is

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571-272-2218. The examiner can normally be reached on Monday-Thursday from 7:30 to 4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hoff Marc, can be reached on weekdays at telephone number 571-272-2218. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Donald E. McElhenry, Jr.  
Primary Examiner  
Art Unit 2857